### West Virginia Department of Environmental Protection Division of Air Quality

## **Fact Sheet**



# For Final Renewal Permitting Action Under 45CSR30 and Title V of the Clean Air Act

Permit Number: **R30-08100155-2013**Application Received: **October 10, 2012**Plant Identification Number: **081-00155** 

Permittee: Raleigh County Solid Waste Authority
Facility Name: Raleigh County Sanitary Landfill
Mailing Address: 200 Fernandez Drive, Beckley, WV 25801

Revised: N/A

Physical Location: Beckley, Raleigh County, West Virginia

UTM Coordinates: 485.50 km Easting • 4186.39 km Northing • Zone 17

Directions: From State Route 41 near Beckley, WV, take County Route 8 (Ragland

Road) to Fernandez Drive. The landfill entrance is the first road on the

right off Fernandez Drive.

#### **Facility Description**

The Raleigh County Sanitary Landfill is a municipal solid waste (MSW) management facility that operates under SIC Code 4953. The landfill accepts municipal solid waste, construction and demolition debris and approved residual waste streams.

#### **Emissions Summary**

Plantwide Emissions Summary [Tons per Year]		
Regulated Pollutants	<b>Potential Emissions</b>	2010 Actual Emissions
Carbon Monoxide (CO)	61.9	18.41
Nitrogen Oxides (NO <sub>X</sub> )	10.8	3.15
Particulate Matter (PM <sub>2.5)</sub>	8.9	NA

Regulated Pollutants	Potential Emissions	2010 Actual Emissions
Total Particulate Matter (TSP)	184.9	64.9
Sulfur Dioxide (SO <sub>2</sub> )	2.6	0.8
Volatile Organic Compounds (VOC)	14.3	7.34

 $PM_{2.5}$  and  $PM_{10}$  are components of TSP.

<b>Hazardous Air Pollutants</b>	Potential Emissions	2010 Actual Emissions
Total HAPs	10.7	5.22

Some of the above HAPs may be counted as PM or VOCs.

Other Regulated Pollutants	Potential Emissions	2010 Actual Emissions
NMOC	35.9	NA
Hydrogen Sulfide	1.2	NA

Non-methane organic compounds (NMOC) – The current emission rate estimate (calculated for year 2012) is 35.9 Mg/yr. The projected closure year is 2061 with a projected maximum NMOC emission rate estimate greater than 53.52\* Mg/yr. The NMOC emission rate estimates were calculated using EPA's Landfill Gas Emissions Model (LandGEM) software. The values used for k and  $L_o$  were 0.050 year<sup>-1</sup> and 170 m³/Mg respectively. The site specific NMOC concentration used in the model was 260 ppmv, as determined by Tier 2 testing in November 2012.

#### **Title V Program Applicability Basis**

This facility has a design capacity over 2.5 million megagrams and 2.5 million cubic meters. Due to this facility's design capacity the Raleigh County Sanitary Landfill is required to have an operating permit pursuant to Title V of the Federal Clean Air Act as amended and 45CSR30.

#### **Legal and Factual Basis for Permit Conditions**

The State and Federally-enforceable conditions of the Title V Operating Permits are based upon the requirements of the State of West Virginia Operating Permit Rule 45CSR30 for the purposes of Title V of the Federal Clean Air Act and the underlying applicable requirements in other state and federal rules.

This facility has been found to be subject to the following applicable rules:

Federal and State:	
45CSR6	Open burning prohibited.
45CSR11	Standby plans for emergency episodes.
45CSR13	Permits For Construction, Modification, Relocation
	and Operation of Stationary Sources.
45CSR16	Standards of Performance For New Stationary
	Sources.
45CSR23	To Prevent and Control Emissions From Municipal
	Solid Waste Landfills

<sup>\*</sup>The actual closure date exceeds LandGEM's 80-year waste acceptance limit. The landfill closure year with the 80-year limit is projected to be 2053 with NMOC emissions estimated at 53.52 Mg/yr

WV Co	de § 22-5-4 (a) (14)	The Secretary can request any pertinent information such as annual emission inventory reporting.
45CSR	30	Operating permit requirement.
40 C.F.	R. Part 60, Subpart WWW	Standards of Performance for Municipal Solid Waste Landfills.
40 C.F.	R. Part 61	Asbestos inspection and removal
40 C.F.	R. Part 82, Subpart F	Ozone depleting substances
State Only:		
45CSR	4	No objectionable odors.
45CSR	17	To Prevent and Control Particulate Matter Air
		Pollution From Materials Handling, Preparation,
		Storage and Other Sources of Fugitive Particulate
		Matter.

Each State and Federally-enforceable condition of the Title V Operating Permit references the specific relevant requirements of 45CSR30 or the applicable requirement upon which it is based. Any condition of the Title V permit that is enforceable by the State but is not Federally-enforceable is identified in the Title V permit as such.

The Secretary's authority to require standards under 40 C.F.R. Part 60 (NSPS), 40 C.F.R. Part 61 (NESHAPs), and 40 C.F.R. Part 63 (NESHAPs MACT) is provided in West Virginia Code §§ 22-5-1 *et seq.*, 45CSR16, 45CSR34 and 45CSR30.

#### **Active Permits/Consent Orders**

Permit or	Date of	Permit Determinations or Amendments That
Consent Order Number	Issuance	Affect the Permit (if any)
R13-2671A	December 6, 2007	

Conditions from this facility's Rule 13 permit(s) governing construction-related specifications and timing requirements will not be included in the Title V Operating Permit but will remain independently enforceable under the applicable Rule 13 permit(s). All other conditions from this facility's Rule 13 permit(s) governing the source's operation and compliance have been incorporated into this Title V permit in accordance with the "General Requirement Comparison Table B," which may be downloaded from DAQ's website.

#### **Determinations and Justifications**

This is the renewal of the Title V permit which was issued on May 2, 2008. Changes to the most recent version of the Title V Permit consist of the following:

In the Emission Units table of Section 1.1, the design capacity of the active landfill gas collection system with flare (31C) was changed from 2000 SCFM to 1200 SCFM. This is due to the fact that the facility installed a different flare than the one proposed in the R13-2671A application. There was no modification to the R13 Permit for this variation, since under 45CSR§13-2.17.f.1, replacement of control equipment that is at least as effective in the control of air pollutant emissions as the equipment replaced does not constitute a modification of a stationary source.

The facility has completed its active gas collection system and as a result, the 30 passive vent flares identified as 01C-30C in the 2008 Title V permit are no longer in use and the following changes were made to remove them and their associated conditions from the Title V permit.

Condition	Changes Made
1.1	Emission Units 01C-30C removed.
4.0	Edited to remove passive vent flares.
4.1.1	Edited to remove passive vent flares.
4.1.3	Edited to remove passive vent flares.
4.1.4 & 4.1.5	Edited to pertain to just Flare 31C.
4.3.1	Removed sentence in middle of paragraph pertaining to passive vent flares.

#### **Non-Applicability Determinations**

The following requirements have been determined not to be applicable to the subject facility due to the following:

40 C.F.R. §60.757 (a)(3)	The design capacity of this facility is greater than 2.5 million megagrams and 2.5 million cubic meters. Therefore, amended design capacity reports are not required. [40 C.F.R. §60.752 (a)]
40 C.F.R. Part 64	The facility does not have any pollutant specific emissions units (PSEU) that satisfy all of the applicability criteria requirements of 40 CFR §64.2(a). [(1) have pre-control regulated pollutant potential emissions (PTE) equal to or greater than the "major" threshold limits to be classified as a major source; 2) are subject to an emission limitation or standard and; 3) have a control device to achieve compliance with such emission limitation or standard.] Therefore, the facility is not subject to the Compliance Assurance Monitoring (CAM) rule.
40 C.F.R. Part 63 Subpart AAAA	National Emission Standards for Hazardous Air Pollutants: Municipal Solid Waste Landfills. This facility is not subject to 40 C.F.R. Part 63 Subpart AAAA since the facility is not a major source of HAPs, nor is it is collocated with a major source, nor is it an area source landfill that has a design capacity equal to or greater than 2.5 million megagrams (Mg) and 2.5 million cubic meters (m³) and has estimated uncontrolled emissions equal to or greater than 50 megagrams per year (Mg/yr) NMOC.
40 C.F.R. §61.154	The facility does not receive asbestos-containing waste material from sources covered under 40 C.F.R. §61.149, §61.150, or §61.155.
40 C.F.R. 60 Subpart Kb	The Leachate Tanks VOL vapor pressures are less than 3.5 kPa

#### **Request for Variances or Alternatives**

None

#### **Insignificant Activities**

Insignificant emission unit(s) and activities are identified in the Title V application.

#### **Comment Period**

Beginning Date: January 23, 2013 Ending Date: February 22, 2013 All written comments should be addressed to the following individual and office:

Robert Mullins
Title V Permit Writer
West Virginia Department of Environmental Protection
Division of Air Quality
601 57<sup>th</sup> Street SE
Charleston, WV 25304

#### **Procedure for Requesting Public Hearing**

During the public comment period, any interested person may submit written comments on the draft permit and may request a public hearing, if no public hearing has already been scheduled. A request for public hearing shall be in writing and shall state the nature of the issues proposed to be raised in the hearing. The Secretary shall grant such a request for a hearing if he/she concludes that a public hearing is appropriate. Any public hearing shall be held in the general area in which the facility is located.

#### **Point of Contact**

Robert Mullins West Virginia Department of Environmental Protection Division of Air Quality 601 57<sup>th</sup> Street SE Charleston, WV 25304

Phone: 304/926-0499 ext. 1243 • Fax: 304/926-0478

#### **Response to Comments (Statement of Basis)**

Not applicable.